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BIRCH STEWART KOLASCH & BIRCH
PO BOX 747
FALLS CHURCH, VA 22040-0747

EXAMINER

MCCLELLAND, KIMBERLY KEIL

ART UNIT PAPER NUMBER

1734

DATE MAILED: 10/16/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/507,927

Applicant(s)

TATEISHI, TOMOMI

Examiner

Kimberly K. McClelland

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE _____ MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 10 August 2006.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,2,4-14 and 16-18 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,2,4-14 and 16-18 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on _____ is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

2. Claims 1, 13, 17, and 18 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention. The specification and drawings of record do not support transferring the entire thin film onto laminate. There is no suggestion of transferring the entire thin-film layer in page 16, line 20 through page 17, line 7 or in Figure 1 as declared by applicant. To transfer the entire thin-film layer, the substrate must be at least the same dimensions of thin-film layer. This new limitation constitutes new matter.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the

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applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

4. Claims 1-2, 4-14, and 16-18 are rejected under 35 U.S.C. 102(b) as being anticipated by U.S. Patent No. 6,194,119 B1 to Wolk et al.

With respect to Claim 1, Wolk et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Wolk et al. discloses heating (column 4, lines 31-37) and pressing (column 7, lines 18-22) a transfer material having an organic thin-layer (column 2, lines 38-41) formed on a temporary support (column 1, line 66-column 2, line 5) and a first laminate comprising a substrate (column 19, lines 17-22) and at least a transparent conductive layer or a rear-surface electrode (column 19, lines 42-45) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 5A), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (column 12, lines 9-13); and bonding a second laminate (column 12, lines 45-56) comprising a substrate (copper phthalocyanine, column 23, lines 41-42) and at least a rear-surface electrode or a transparent conductive layer (aluminum cathode, column 23, lines 44-45) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared heater (column 32, line 15-column 24, line 22, column 12, lines 9-13, column 8, lines 38-40 and column 4, lines 31-37).

As to Claim 2, Wolk et al. discloses transferring by heating and pressing (column 7, lines 18-22).

As to claim 4, Wolk et al. discloses the transfer material is formed by a wet method (coating, column 5, lines 48-50).

As to claim 5, Wolk et al. discloses the second laminate has an organic thin-film layer formed on the rear-surface electrode (column 23, lines 47-49).

As to claim 6, Wolk et al. discloses the first laminate and second laminate have a thermal expansion coefficient of 20ppm/°C or less (column 19, lines 17-29, column 15, lines 48-59, column 32, line 15-column 24, line 22).

As to claim 7, Wolk et al. discloses the organic thin-film layer contains at least a light-emitting, organic compound or a carrier-transporting, organic compound (column 2, lines 37-41).

As to claim 8, Wolk et al. discloses a hole-transporting, organic thin-film layer, a light-emitting, organic thin-film layer and an electron-transporting, organic thin-film layer are successively transferred (column 15, lines 11-16, and column 16).

As to claim 9, Wolk et al. discloses at least one of said first substrate and said second substrate is provided with a transparent conductive layer (column 15, lines 40-43).

As to claim 10, Wolk et al. discloses at least one of said temporary support and said substrate is in the form of a continuous web (column 7, lines 9-11).

As to claim 11, Wolk et al. discloses the substrate is made of at least one material selected from the group consisting of polyimides; polyesters; polycarbonates;

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polyether sulfone; metal foils such as aluminum foil, copper foil, stainless steel foil, gold foil, silver foil; plastic sheets of liquid crystal polymers; fluorine-containing polymers such as polytchloroziuroethylene), polytetrafluoroethylene, polytetrafluoroethylene-polyethylene copolymers (column 19, lines 17-29).

As to claim 12, Wolk et al. discloses a device formed from claim 1 (column 15, lines 55-column 16, line 22).

As to claim 13, Wolk et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Wolk et al. discloses heating (column 4, lines 31-37) and pressing (column 7, lines 18-22) a transfer material having an organic thin-layer (column 2, lines 38-41) formed on a temporary support (column 1, line 66-column 2, line 5) and a first laminate comprising a substrate (column 19, lines 17-22) and at least a transparent conductive layer or a rear-surface electrode (column 19, lines 42-45) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 5A), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (column 12, lines 9-13); and bonding a second laminate (column 12, lines 45-56) comprising a substrate (copper phthalocyanine, column 23, lines 41-42) and at least a rear-surface electrode or a transparent conductive layer (aluminum cathode, column 23, lines 44-45) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared

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heater (column 32, line 15-column 24, line 22, column 12, lines 9-13, column 8, lines 38-40 and column 4, lines 31-37).

As to claim 14, Wolk et al. discloses transferring by heating and pressing (column 7, lines 18-22).

As to claim 16, Wolk et al. discloses the second laminate has an organic thin-film layer formed on the rear-surface electrode (column 23, lines 47-49).

As to claim 17, Wolk et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Wolk et al. discloses heating (column 4, lines 31-37) and pressing (column 7, lines 18-22) a transfer material having an organic thin-layer (column 2, lines 38-41) formed on a temporary support (column 1, line 66-column 2, line 5) and a first laminate comprising a substrate (column 19, lines 17-22) and at least a transparent conductive layer or a rear-surface electrode (column 19, lines 42-45) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 5A), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (column 12, lines 9-13); and bonding a second laminate (column 12, lines 45-56) comprising a substrate (copper phthalocyanine, column 23, lines 41-42) and at least a rear-surface electrode or a transparent conductive layer (aluminum cathode, column 23, lines 44-45) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared

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heater (column 32, line 15-column 24, line 22, column 12, lines 9-13, column 8, lines 38-40 and column 4, lines 31-37).

As to claim 18, Wolk et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Wolk et al. discloses heating (column 4, lines 31-37) and pressing (column 7, lines 18-22) a transfer material having an organic thin-layer (column 2, lines 38-41) formed on a temporary support (column 1, line 66-column 2, line 5) and a first laminate comprising a substrate (column 19, lines 17-22) and at least a transparent conductive layer or a rear-surface electrode (column 19, lines 42-45) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 5A), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (column 12, lines 9-13); and bonding a second laminate (column 12, lines 45-56) comprising a substrate (copper phthalocyanine, column 23, lines 41-42) and at least a rear-surface electrode or a transparent conductive layer (aluminum cathode, column 23, lines 44-45) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared heater (column 32, line 15-column 24, line 22, column 12, lines 9-13, column 8, lines 38-40 and column 4, lines 31-37).

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5. Claims 1-2, 4, 7-14, and 17-18 are rejected under 35 U.S.C. 102(e) as being anticipated by U.S. Patent Application Publication No. 2002/0127877 to Shibata et al.

With respect to Claim 1, Shibata et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Shibata et al. discloses heating and pressing (See Paragraph 0062) a transfer material having an organic thin-layer (112) formed on a temporary support (111) and a first laminate comprising a substrate (101) and at least a transparent conductive layer or a rear-surface electrode (102) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 2), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (See Paragraph 0062); and bonding a second laminate comprising a substrate and at least a rear-surface electrode or a transparent conductive layer (See paragraph 0002) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared heater (See paragraph 0062).

As to Claim 2, Shibata et al. discloses transferring by heating and pressing (See paragraph 0062).

As to claim 4, Shibata et al. discloses the transfer material is formed by a wet method (See paragraph 0057).

As to claim 7, Shibata et al. discloses the organic thin-film layer contains at least a light-emitting, organic compound or a carrier-transporting, organic compound (See paragraph 0058).

As to claim 8, Shibata et al. discloses a hole-transporting, organic thin-film layer, a light-emitting, organic thin-film layer and an electron-transporting, organic thin-film layer are successively transferred (See paragraph 0044).

As to claim 9, Shibata et al. discloses at least one of said first substrate and said second substrate is provided with a transparent conductive layer (102).

As to claim 10, Shibata et al. discloses at least one of said temporary support and said substrate is in the form of a continuous web (See Figure 2).

As to claim 11, Shibata et al. discloses the substrate is made of at least one material selected from the group consisting of polyimides; polyesters; polycarbonates; polyether sulfone; metal foils such as aluminum foil, copper foil, stainless steel foil, gold foil, silver foil; plastic sheets of liquid crystal polymers; fluorine-containing polymers such as polytchlorozuoroethylene), polytetrafluoroethylene, polytetrafluoroethylene-polyethylene copolymers (See paragraph 0072).

As to claim 12, Shibata et al. discloses a device formed from claim 1 (See paragraph 0002).

As to claim 13, Shibata et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Shibata et al. discloses heating and pressing (See paragraph 0062) a transfer material having an organic thin-layer (112) formed on a temporary support (111) and a first laminate comprising a substrate (101) and at least a

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transparent conductive layer or a rear-surface electrode (102) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 2), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (See paragraph 0062); and bonding a second laminate comprising a substrate and at least a rear-surface electrode or a transparent conductive layer (See paragraph 0002) on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared heater (See paragraph 0062).

As to claim 14, Shibata et al. discloses transferring by heating and pressing (See paragraph 0062).

As to claim 17, Shibata et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Shibata et al. discloses heating and pressing (See paragraph 0062) a transfer material having an organic thin-layer (112) formed on a temporary support (111) and a first laminate comprising a substrate (101) and at least a transparent conductive layer or a rear-surface electrode (102) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 2), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (See

paragraph 0062); and bonding a second laminate comprising a substrate and at least a rear-surface electrode or a transparent conductive layer (See paragraph 0002) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared heater (See paragraph 0062).

6. As to claim 18, Shibata et al. discloses a method for thermal transfer for forming organic electroluminescent devices. Shibata et al. discloses heating and pressing (See paragraph 0062) a transfer material having an organic thin-layer (112) formed on a temporary support (111) and a first laminate comprising a substrate (101) and at least a transparent conductive layer or a rear-surface electrode (102) formed on said substrate, which overlap each other such that said organic thin-film layer of said transfer material faces only the side of said substrate having said transparent conductive layer formed thereon being intended to form a receiving surface (See Figure 2), thereby forming a laminate structure; peeling said temporary support from said laminate structure to transfer said organic thin-film layer to said receiving surface of said first laminate (See paragraph 0062); and bonding a second laminate comprising a substrate and at least a rear-surface electrode or a transparent conductive layer (See paragraph 0002) formed on said substrate to said organic thin-film layer transferred onto said first laminate, wherein the heating is carried out by an infrared heater (See paragraph 0062).

The applied reference has a common assignee with the instant application. Based upon the earlier effective U.S. filing date of the reference, it constitutes prior art under 35 U.S.C. 102(e). This rejection under 35 U.S.C. 102(e) might be overcome either by a showing under 37 CFR 1.132 that any invention disclosed but not claimed in

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the reference was derived from the inventor of this application and is thus not the invention "by another," or by an appropriate showing under 37 CFR 1.131.

Response to Arguments

7. Applicant's arguments filed 8/10/06 have been fully considered but they are not persuasive.

8. Applicant alleges on page 7 of arguments that examiner acknowledges that Wolk only transfers a portion of the transfer material. However, page 8 of the previous action states that applicant had not claimed transferring the entire thin-film layer. The action dated 5/11/06 states:

Applicant also argues Wolk only transfers a portion of the transfer material, as opposed to the entire pattern material of the organic-film layer. In response to applicant's argument that the references fail to show certain features of applicant's invention, it is noted that the features upon which applicant relies (i.e., transferring the entire organic thin-film layer) are not recited in the rejected claim(s). Although the claims are interpreted in light of the specification, limitations from the specification are not read into the claims. See *In re Van Geuns*, 988 F.2d 1181, 26 USPQ2d 1057 (Fed. Cir. 1993).

Here, the examiner is stating that it is ineffectual to argue differences between the references cited and the current application that are not claimed. Consequently, no statement was made indicating a deficiency in the Wolk reference.

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9. Applicant also argues that Wolk does not transfer the entire thin-film layer.

Examiner disagrees. In the Wolk reference, the areas of the film which are heated during the transfer process are transferred entirely. Therefore, Wolk meets the newly claimed limitation of transferring the entire thin film.

Conclusion


Any inquiry concerning this communication or earlier communications from the examiner should be directed to Kimberly K. McClelland whose telephone number is (571) 272-2372. The examiner can normally be reached on 8:00 a.m.-5 p.m. Mon-Fri..

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Chris A. Fiorilla can be reached on (571)272-1187. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



KKM



CURTIS MAYES
PRIMARY EXAMINER